Research Proposal

On

"Developing a Knowledge Management Model for Student Support Services in eLearning Courses"

By

Prashant Barge

Under

Faculty of Management

Guide

Dr. B. R. Londhe

Submitted To

Symbiosis International University, Pune

Abstract

The purpose of this research is to find out integration of Knowledge Management tools and ICT to facilitate student support services in all stages of e –Learning (i.e. pre-admission to post qualification stage) in more effective way and e-Learning for the Higher Education (PG studies) courses in India with reference to Maharashtra would be adopted by more and more learners from across the countries with reducing the attrition rate in such courses which is very high in USA and other countries as talked about in literature.

This research will develop a Knowledge Management Model which will be based upon understanding the learning styles and profiles of different learners from India. Here the learner profile and learning style will be incorporated for getting perfect match between learner and course by providing required student support services by flexible and a personalized approach to facilitate greater adoption of the course. The six variables will be analyzed viz. Relate, Adapt, Attract, Engage, Learn and Use for the same from Pre-admission to Post qualification stages. Relate and Adapt are variables at Pre-Admission stage, while Attract, Engage and Learn are during the course conduction stage. Use of the Knowledge gained during course comes after successful completion of the course and about applying that knowledge for the career advancement. This research will try to prove that the student support services are very important and if offered with flexibility, better personalization and customization for the learner would reduce the possibility of dropout of the learner to a greater extent.

Keywords: e-Learning, ICT, Learning styles, Learner Profile, Knowledge Management.

Introduction

In recent years e-learning has been identified as strategic resources that can be utilized in an increasing diversity of venues (workplace, cultural and entertainment venues, as well as education). Most universities in India as well as the governments are heavily investing to reform the education sector and bring it in line with proposals to modernize it with information and communication technology (ICT) usage within this sector. Moreover, universities are promoting open and lifelong learning and on-the-job training opportunities by means of Information and Communications Technology which is transforming the teaching and learning experience in these institutions. Nearly all universities are now concerned with the Internet availability in campuses and the availability of the number of computers has been increased. However the vast majority of these institutions are only beginning to tap into the potential of modernize information and communication technology, and not yet utilized full capacity of e-Learning capabilities for inclusive growth.

Thus, for the country like India, where youth population is more (0-14 yesrs almost 30% and 15-64 years almost 65 %) and will increase over the years (CIA: the World Factbook report 2011) and youth percentage in PG studies is comparatively low because of issues of institutional capacities and capabilities as mentioned in UGC's report on 11th Plan for Higher Education in India, the importance of e-Learning for that matter cannot be ignored, but it is the only solution to provide the quality education for large number.

Research Questions

This research will try to answer following main questions and other related questions.

- What is satisfaction level about Student Support Services in e-Learning environment in India at
    - A. Pre-admission process
    - B. During Course Conduction
    - C. After Course Completion
- How Knowledge Management has a positive contribution for understanding different variables at these three stages for e-learning adoption, personalization and effectiveness of the courses?

Some Important Literature about KM integration with eLearning

Very less literature is available in this field, none in India

- Rowley (2000), His research reveals great interest in introducing Knowledge Management (KM) ideas to e-learning systems.
- Fuchs, et.al, (2004) discussed how digital libraries and available media collectively are building up new knowledge in the sector of education and learning.
- Keulartz, and Schermer (2004), KM and e-learning will converge into knowledge collaboration portals that will efficiently transfer knowledge in an interdisciplinary and cross functional environment.
- Sophie E. Peter (2010) discussed about the problem of Adaptability and personalization in common e-Learning Systems like Black Box and Moodle. Finding of the research described the limited personalization and how it is addressed by using individual learning styles and learner profile using Knowledge Management Practices.

Research Aims / Objectives

1. To study knowledge management tools and practices, this can be applied to Student Support Services for more flexibility, better personalization and customization for the learner at different stages to suit different Learning Styles of the Learners.
    a. Pre-Admission
    b. Course Conduction
    c. Post Qualification
2. To accelerate adoption of e-Learning at Post Graduate studies in India
3. Bring down the attrition rate by facilitating Learner and Courses best fit, engaging the learner with the course and making the course more effective.
4. To help course developers in designing e-Learning courses that offers more flexibility and effectiveness.

Hypothesis

1. Pre-admission student support services has critical role in the increasing awareness and adaption of the course in e-Learning environments.
2. During course conduction flexible and personalized student support motivates the students to complete the course.
3. After course completion student support services are the measures of effectiveness of e-courses.

Scope of the Study

Students from e-Learning courses conducted at Higher Education (PG studies) in India (MAH) which include

1. Single and Dual mode universities
2. Private and Public Universities
3. Open Universities

4. Deemed Institutes.

Proposed Methodology

This is an explorative research along with investigating new Knowledge Management Model to solve the identified research questions.

The Non probability purposive sampling will be used to select e-Learning courses at PG studies from top 10 universities in Maharashtra (India), based on number of admissions. Sample size will be appropriately selected to represent the population, so as to minimize sampling and bias errors.

Secondary Data about admissions and drop out will be collected from the different reports of the selected universities for each course. Secondary Data about systems and methodologies will be studied by observations, manuals and interviews with the respective staff, faculties and authorities.

Tools of Data Collection

The primary data will be collected through

a. Survey using Questionnaire for e-Learners (using e-mails)
b. Focused Interview for the Support Staff (Telephonic / face to face) for understanding different support systems.
c. Systems study for interface, motivation, personalization, engagement and pedagogical issues.

Secondary Data about number of Learner admissions and drop-outs will be taken from Admission Reports and Logs from the system.

Data Analysis and Interpretation

1. Regression Analysis will be done to find out effect of different variables on the adoption of e-Learning methodology.

2. Critical Analysis of different courses / universities initiatives will be done to get the different parameters / factors which will help to design the Knowledge Framework

3. Trend in Drop out, its interpretation will be done to help the above said regression.

4. Comparative analysis between pre and post framework implementation will be done to understand the effectiveness of the new framework.

5. For the analysis, statistic tools and software like EXCEL, SPSS, LINGO will be used.

Outcomes Intended

- New Knowledge Management Model, for e-Learning Courses at Higher Education (PG Studies) would be invented based on Learner Profile and learning styles.
- Best Integration of student support systems in e-Learning environments using Knowledge Management Tools and methods for increased effectiveness.
- Increased admissions in e-Learning at Post Graduate studies.
- Better e-Learning experience because of more flexibility and personalization in support services for the learner.
- Reduction in Drop out rate from e-Learning environments.

Literature Review

1. Astin A W (1975) “Preventing students form dropping out” San Francisco: Jossey-Bass.

2. Alhotra, Y. (2000), Knowledge Management for E-business Performance: Advancing Information Strategy to 'Internet Time' Information Strategy, The Executive Journal, Vol. 16, No. 4, pp. 5-16.
3. Bean J (1980) “Dropouts and turnover: The synthesis and test of casual model of student attrition” Research in Higher Education, 12(2), 155-187.
4. Berge Z and Huang Y (2004) “A model for sustainable student retention : A holistic perspective on the student dropout problem with special attention to e-Learning”, DEOSNEWS, Vol. 13(5).
5. Boyd D (2004) “The characteristics of successful online students”, New Horizons in Adult Education, 18(2), 31-39.
6. Dagger D and Wade V P (2004) “Evaluation of Adaptive Course Construction Toolkit (ACCT).
7. Diaz D (2002) “Online drop rates revisited”, Technology Source, May/June. From http://technologysource.org/article/online_drop_rates_revisited.
8. Dr. Kamal Kishore Jain (2002) “Motivating e-Learners – a case study of e-Learners seeking an advanced degree from NUITAR”, Students Affairs online, Vol. 03, No. 04, Fall 2002.
9. Draper S. (2003) “Tinto’s model of student retention”,
10. Flood J (2002) “Read all about it: online learning facing 80% attrition rates”, TOJDE, Vol.3 (2).
11. Garrison R and Anderson T (2003) “e-Learning in the 21st century: a framework for research and practice”, London: Routledge Falmer.
12. Kidwell J, Vander Linde and Johnson S (2000) “Applying corporate Knowledge management practices in Higher Education” Educause Quarterly, 4, 2000, 28-33.
13. Levy Y (2007) “Comparing dropouts and persistence in e-Learning Courses”, Computers and Education, 48(2), 185-204.
14. Pallloff, Rena M, and Keith Pratt (2002) “Beyond the looking glass: What faculty and students need to be successful online” Handbook of Online Learning, pp. 171-185
15. Parker A (1999) “A study of variables that predict dropout from distance education” International Journal of Education Technology, Vol. 1(2).

16. Rossett A Schafer L (2003) “What can we do about e-Dropouts” Training and Development, 56(6), 40-46.
17. Sophie E Peter and Elizabeth Bacon, Mohammad Dastbaz (2010) “Adaptable, personalized e-Learning incorporating learning styles” Campus-wide information systems, Vol. 27(2), 2010, pp. 91-100.
18. Wang G, Focar-Szocki D and Griffen O, O’Connor and Sceiford E (2003) “Departure, abandonment and dropout of e-Learning: Dilemma and solutions” James Madison university.
19. Wang Y, Peng H, Huyang R, Hou Y and Wang J (2008) “Characteristics of distance learners : research on relationships of learning motivation, learning strategy, self efficacy, attribution and learning results” The journal of Open and Distance Learning, 23(1), 17-28.
20. Whipp J L and Chiarelli S. (2004) “Self-regulation in Web-Based Course: A case study” Educational Technology Research and Development, Vol.52 (4), 5-22.
21. Yorke M (2004) “Retention, persistence and success I on-campus higher education and their enhancement in Open and Distance learning” Open Learning, Vol. 19(1), 19-32
22. Manjul Sahay (2009), “e-Learning for Indian Higher Education: the complete solution approach”
23. Sanjay Rajpal (2008), “e-Learning Revolution: status of educational programs in India, IMECS, Hong Kong.
24. Nilay Yajnik, “e-Learning technologies for Rural India”, NMIMS, Mumbai
25. Sanat Kaul (2006), “Higher education in India: seizing the opportunity”, ICRIER.
26. Anantatmula, S. and Stankosky, M. (2008), ‘KM criteria for different types of organizations’, Int. J. Knowledge and Learning, Vol. 4, No. 1, pp18–35.
27. Barker, P. (2005), Knowledge management for e-learning, Journal of Innovation in Education and Teaching International, Vol. 42, No. 2, pp111-121.
28. Denning, S. (2000), The Springboard: How Storytelling Ignites Action in Knowledge-Era Organizations, Boston: Butterworth Heinemann.

29. Fuchs, M., Muscogiuri, C., Niederee, C., and Hemmje, M, (2004), Digital Libraries, in Knowledge Management: an e-learning case study, International Journal of Digital Library, Vol. 4, No. 1, pp31-35.
30. Hildreth, P., Kimble, C., and Wright, P. (2000), Communities of Practice in Distributed International Environment, Journal of KM, Vol. 4, No. 1, pp27-37.
31. Hiltz, R. (1986), The Virtual Classroom: Using Computer-mediated Communication for University Teaching, Journal of Communication, Vol. 36, No. 2, pp95-104.
32. Hodgins, W. (2003), Information about All the Learning Students Being Developed. Available at: WWW.Learnativity.com/standards.html.
33. Kimble, C., Li, F., and Barlow, A. (2002), Effective Virtual Teams through Communities of Practice, Availableat:http://mansci.strath.ac.uk/papers.html.
34. Keulartz, J, and Schermer, M., (2004), Ethics in Technological Culture: A Programmatic Proposal for a Pragmatist Approach, Journal of Science Technology Human Value, Vol. 29, No. 1, pp. 3-29.
35. Lamb, R., and Kling, R. (2003), Conceptualizing Users as Social Actors in Information Systems Research, Vol. 27, No. 2, pp. 197-235.
36. Nottingham, A., and Park, B. (1999), Knowledge Management, Reconsidering Knowledge Workers, Proceedings of the 9th Annual BIT Conference, Manchester University), Paper No. 78.
37. Na Ubon, A., and Kimble, C. (2002), Knowledge Management in Online Distance Education, Working Paper, University of York, UK, P6.
38. Orlikowski, J. (2000), Using Technology and Constituting Structures: A Practice Lens for Studying Technology in organizations, Journal of Organization Science, Vol. 11, No. 4, pp. 404-428.
39. Paranjpe, R. (2003), Knowledge management and online education, International Conference on Open and Online Learning, Mauritius.
40. Rowley, J. (2000), From Learning organization to Knowledge Entrepreneur, Journal of KM, Vol. 4, No. 1, pp.7-14.
41. Thiessen, V., and Looker, E. (2007), Digital Divides and Capital Conversion: The Optimal use of Information and Communication Technology for Youth reading

Achievement, Journal of Information and Communication and /society, Vol. 10, No. 2, pp. 159-180.

42. Widding, O. (2007) 'Entrepreneurial knowledge management and sustainable opportunity creations: a conceptual framework', Int. J. Learning and Intellectual Capital, Vol. 4, Nos. 1–2, pp.187–202.
43. Woodill, G. (2004), Where is the Learning in e-learning? : A Critical analysis of the e-learning industry. Available at: www.operitel.com.
44. Wathen, N., and Burkell, J. (2002), Believe it or Not: Factors Influencing Credibility on the Web, Journal of American Society for Information Science and Technology, Vol. 53, No. 2, p134.
45. Yordanova, K. (2007), 'Integration of knowledge management and e-learning, common features', International Conference on Computer Systems and Technologies, Sofia, Bulgaria, 14–15 June.